

IN THE CLAIMS:

Please ADD new claims 47 and 48, as follows. For the Examiner's convenience, all claims currently pending in this application have been reproduced below:

1-15. (Cancelled)

16. (Original) An exposure method of transferring a master pattern onto a substrate while moving a controlled element concerning exposure operation, comprising:

transferring the master pattern onto the substrate while moving the controlled element in accordance with a target locus generated in correspondence with a shape characteristic of the mask pattern and a shape characteristic of a pattern already formed on the substrate.

17-30. (Cancelled)

31. (Original) A device manufacturing method comprising:

the first coating step of coating a substrate with a first resist;

the first exposure step of transferring a first master pattern onto the substrate coated with the first resist;

the first developing step of developing the substrate bearing the first master pattern;

the second coating step of coating the developed substrate with a second resist;
the second exposure step of transferring a second master pattern onto the
substrate coated with the second resist; and

the second developing step of developing the substrate bearing the second
master pattern,

wherein the second exposure step includes

the correction step of correcting a target locus of a controlled element
concerning exposure operation on the basis of correction information corresponding to a shape
characteristic of the second master pattern and/or a shape characteristic of a pattern formed on
the substrate after the first developing step, and

the transfer step of transferring the second master pattern onto the substrate
while moving the controlled element toward the corrected target locus.

32. (Original) The method according to claim 31, wherein different types of exposure
apparatuses are used in the first and second exposure steps.

33. (Previously Presented) An exposure method of transferring a pattern onto a
substrate while moving an element concerning the transfer, said method comprising a step of:

transferring a second pattern onto the substrate, onto which a first pattern has
been transferred, while moving the element based on information prepared with respect to

each position of the element for correcting an overlay error between the first and second patterns.

34. (Previously Presented) A method according to claim 33, wherein the information is prepared with respect to at least one of a group of a shape characteristic of the first pattern already transferred onto the substrate, a shape characteristic of the second pattern, a characteristic of an exposure apparatus used for the transfer, a direction in which the element is to be moved, and a speed at which the element is to be moved.

35. (Previously Presented) A method according to claim 34, further comprising a step of synthesizing first and second information, the first and second information being prepared as information with respect to each of two of a shape characteristic of the first pattern already transferred onto the substrate, a shape characteristic of the second pattern, and a characteristic of an exposure apparatus used for the transfer, wherein in said transferring step the element is moved based on information obtained in said synthesizing step.

36. (Previously Presented) A method according to claim 34, wherein the shape characteristic of the second pattern is obtained based on a master to be used of the transfer.

37. (Previously Presented) A method according to claim 33, further comprising a step of providing a user interface for setting the information.

38. (Previously Presented) A method according to claim 33, wherein the element includes at least one of the substrate, a master having a second pattern and an element of an optical system.

39. (Previously Presented) An exposure apparatus for transferring a pattern onto a substrate while moving an element concerning the transfer, said apparatus comprising:

a moving unit which moves the element; and

a control unit which controls said moving unit so as to move the element based on information prepared with respect to each position of the element for correcting an overlay error between first and second patterns during transferring the second pattern onto the substrate onto which the first pattern has been transferred.

40. (Previously Presented) An apparatus according to claim 39, wherein the information is prepared with respect to at least one of a group of a shape characteristic of the first pattern already transferred onto the substrate, a shape characteristic of the second pattern, a characteristic of said exposure apparatus used for the transfer, a direction in which the element is to be moved, and a speed at which the element is to be moved.

41. (Previously Presented) An apparatus according to claim 39, further comprising a synthesizing unit which synthesizes first and second information, the first and second information being prepared as the information with respect to each of the two of a shape

characteristic of the first pattern already transferred onto the substrate, a shape characteristic of the second pattern, and a characteristic of an exposure apparatus used for the transfer, wherein said control unit controls said moving unit so as to move the element based on information obtained by said synthesizing unit.

42. (Previously Presented) An apparatus according to claim 40, wherein the shape characteristic of the second pattern is loaded based on a master designated in a job file.

43. (Previously Presented) An apparatus according to claim 39, further comprising a system which provides a user interface for setting the information.

44. (Previously Presented) An apparatus according to claim 39, wherein the element includes at least one of the substrate, a master having the second pattern and an element of an optical system.

45. (Previously Presented) A device manufacturing method comprising a step of transferring a second pattern onto a substrate, onto which a first pattern has been transferred, using a second exposure apparatus defined in claim 39.

46. (Previously Presented) A method according to claim 45, wherein the first pattern has been transferred using a first exposure apparatus different from the second exposure apparatus.

47. (New) An exposure method of scan-exposing a surface of a substrate placed on a substrate stage to a pattern of an original placed on an original stage through a projection optical system, said method comprising steps of:

setting a target locus, of the substrate stage, corresponding to the original;

preparing a correction table for correcting a shape error of a pattern of the original formed on the substrate; and

correcting the target locus of the substrate stage based on the correction table.

48. (New) An exposure method of scan-exposing a surface of a substrate placed on a substrate stage to a pattern of an original placed on an original stage through a projection optical system, said method comprising:

setting a target locus, of the original stage, corresponding to the original;

preparing a correction table for correcting a shape error of a pattern of the original formed on the substrate; and

correcting the target locus of the original stage based on the correction table.